

How Virtualization Works

The heart of virtualization is the "virtual machine" (VM), a tightly isolated software container with an operating system and application inside. Because each VM is completely separate and independent, many of them can run simultaneously on a single computer. A thin layer of software called a hypervisor decouples the VMs from the host, and dynamically allocates computing resources to each VM as needed.

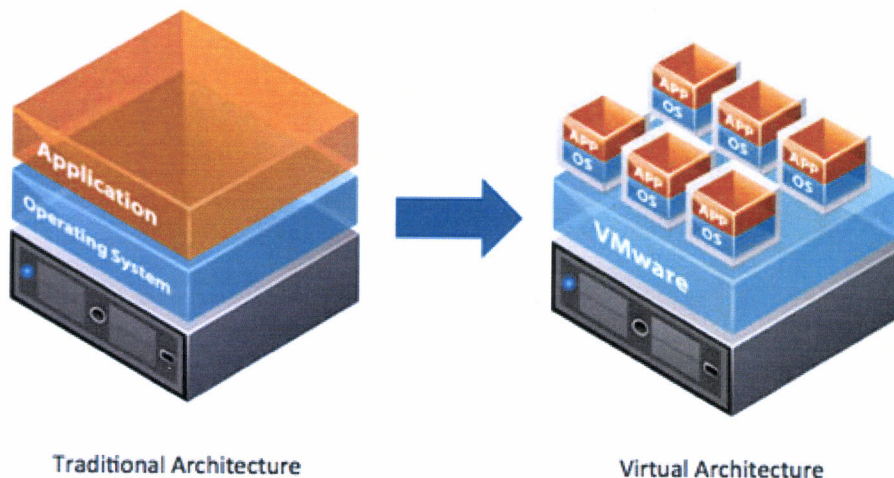
This architecture redefines your computing equation, to deliver:

- **Many applications on each server.** As each VM encapsulates an entire machine, many applications and operating systems can be run on one host at the same time.
- **Maximum server utilization, minimum server count.** Every physical machine is used to its full capacity, allowing you to significantly reduce costs by deploying fewer servers overall.
- **Faster, easier application and resources provisioning.** As self-contained software files, VMs can be manipulated with copy-and-paste ease. This brings unprecedented simplicity, speed, and flexibility to IT provisioning and management. VMs can even be transferred from one physical server to another while running, via a process known as live migration. You can also virtualize business-critical apps to improve performance, reliability, scalability, and reduce costs.

[Learn more about application virtualization](#)

Virtualization Defined

For those more visually inclined...



CSI Collapse Ratio 15 Virtual Servers to 1 Physical Server

Physical Server Cost = \$20,000

Virtual Server Cost = \$6667.00